

ABSTRACT OF THE DISCLOSURE

A demodulation circuit receives an OFDM transmit signal containing an information carrier, an additive-information transmission carrier, and a reception-synchronization pilot signal to convert these carriers and signal into frequency-axial data. The information carrier transmits information data. The additive-information transmission carrier and the reception-synchronization pilot signal have a lower multi-valued modulation degree than the information carrier. A differential detection circuit conducts detection processing by using a detection-subject symbol of a plurality of symbols indicated at a predetermined interval in the same frequency range and a symbol ahead that detection-subject symbol by a predetermined time in either one output of the additive-information transmission carrier and the reception-synchronization pilot signal output from the demodulation circuit. A first S/N ratio generating circuit generates an S/N ratio based on a detection output provided from the differential detection circuit. The S/N ratio indicates the reception quality of the OFDM transmit signal.